

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
09/961,205	09/24/2001	Goro Tamai	GP-300567	6870	
. 7590 09/30/2004			EXAMINER		
CHRISTOPHER DEVRIES			AVERY, BRIDGET D		
General Motors Legal Staff	s Corporation		ART UNIT	PAPER NUMBER	
P.O. Box 300, Mail Code 482-C23-B21			3618		
Detroit, MI 4	8265-3000				

DATE MAILED: 09/30/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

					M_			
:	Applica	ation No.	Applicant(s)		, ,			
		,205	TAMAI ET AL.					
Office Action Summary	Examir	ier	Art Unit					
	Bridget	•	3618					
The MAILING DATE of this comm Period for Reply	nunication appears on t	the cover sheet with the	correspondence ac	Idress				
A SHORTENED STATUTORY PERIO THE MAILING DATE OF THIS COMM - Extensions of time may be available under the provisafter SIX (6) MONTHS from the mailing date of this of the period for reply specified above, the maximum. - Failure to reply within the set or extended period for Any reply received by the Office later than three more earned patent term adjustment. See 37 CFR 1.704(UNICATION. sions of 37 CFR 1.136(a). In no communication. rty (30) days, a reply within the s im statutory period will apply and reply will, by statute, cause the a iths after the mailing date of this	event, however, may a reply be statutory minimum of thirty (30) d d will expire SIX (6) MONTHS fro application to become ABANDON	timely filed lays will be considered time om the mailing date of this o NED (35 U.S.C. § 133).					
Status								
1) Responsive to communication(s)	filed on 25 June 2004	Į.						
2a)☐ This action is FINAL.	2b)⊠ This action is							
, , ,	Since this application is in condition for allowance except for formal matters, prosecution as to the ments is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.							
Disposition of Claims								
4) ⊠ Claim(s) <u>25-30</u> is/are pending in 4a) Of the above claim(s) 5) □ Claim(s) is/are allowed. 6) ⊠ Claim(s) <u>25-30</u> is/are rejected. 7) □ Claim(s) is/are objected to resulting and subject to result	is/are withdrawn from o							
Application Papers								
9)☐ The specification is objected to b	y the Examiner.							
10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.								
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).								
Replacement drawing sheet(s) inclu	- '	J	•	` '				
11) The oath or declaration is objected	d to by the Examiner.	Note the attached Office	ce Action or form P	ΓO-152.				
Priority under 35 U.S.C. § 119								
 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. 								
Attachment(s)		_						
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Revie 3) Information Disclosure Statement(s) (PTO-144 Paper No(s)/Mail Date		4) Interview Summa Paper No(s)/Mail 5) Notice of Informa 6) Other:	Date	O-152)				

DETAILED ACTION

1. The response filed by applicant on June 25, 2004 is acknowledged and has been entered.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 2. Claims 25-30 are rejected under 35 U.S.C. 102(b) as being anticipated by Kawakatsu (US Patent 4,335,429).

Kawakatsu teaches

a propulsion system controller for use in a hybrid vehicle including: a motor/generator (5, 7) for providing starting force to an internal combustion engine (1) in a first mode of operation and for generating an electrical charge in a second mode of operation (as described in column 6, lines 50-63 and column 21, lines 60-64); a first operating system, the first operating system capable of varying the prime pulse to an internal combustion engine (1) and the starting force applied to the internal combustion engine (150) by the motor/generator (200) (as described in column 8, lines 43-55 and column 21, lines 58-67), the operating system capable of varying the starting force and the prime pulse according to engine coolant temperature and battery state-of-charge (see column 11,

Application/Control Number: 09/961,205

Art Unit: 3618

lines 42-68 and column 12, lines 1-20); a second operating system, the second operating system varying the state of operation of the motor/generator (5, 7) during a starting sequence of the internal combustion engine (1), the first operating system and the second operating system instructing the motor/generator (5, 7) to operate in between the first and the second modes of operation (between the starting mode and the generating mode); a third operating system, the third operating system varying a degree of electric power being used to drive the vehicle, the degree of electric power corresponding to sensed vehicle operating conditions; a means (see column 7, lines 39-68) for sensing the state-of-charge of an electric storage medium (23), the means for sensing state-of-charge of the electric storage medium (23) capable of being operated by the first operating system; and a means (see column 6, lines 33-44) for sensing the temperature of an engine coolant of an internal combustion engine (1), the means for sensing the temperature of the engine coolant capable of being operated by the first operating system. The method of varying the state of propulsion and the method of controlling a hybrid powertrain, which includes: determining if an engine starting command has been requested; sensing the state-of-charge of an electric storage medium; sensing the temperature of an engine coolant of an internal combustion engine; sensing the temperature of the electric storage medium; determining if a fault condition is present; sensing the operating condition of a motor/generator; controlling the motor/generator operation based upon the state-of-charge and the temperature of the internal combustion engine; varying the starting speed of the motor/generator in the first mode in response to the state of charge of the electric storage medium; varying a

Application/Control Number: 09/961,205

Art Unit: 3618

prime pulse to the internal combustion engine in response to the state of charge of the electric storage medium, and controlling the transmission based upon the operations of the motor/generator is also taught by Kawakatsu. See column 9, lines 13-67 and column 11, lines 42-67.

Response to Arguments

3. Applicant's arguments with respect to claims 25-30 have been considered but are most in view of the new ground(s) of rejection.

Conclusion

4. Any inquiry concerning this communication should be directed to Bridget Avery at telephone number 703-308-2086.

September 24, 2004

CHRISTOPHER P. ELLIS SUPERMISORY PATENT EXAMINER TECHNOLOGY CENTER 8600

Page 4